(NM – 10) Phosphorus Management (Using the P Index Rating)

Site Characteristic	Wt. F.	Weighting Factor (Wt. F.) x Column Factor (0, 1, 2, 4 & 8) = P Index Points					P Index Pts.
		None or Very Low	Low	Medium	High	Very High	
		0	1	2	4	8	
Soil Test P Level	1	V. Low < 8 ppm	Low 8 - 15 ppm	Moderate > 15 - 23 ppm	High > 23-30 ppm	V. High > 30 ppm	2.0
P (P2O5) Appl. Rate	1	None Applied	< 30 lbs/ac	30 - 90 lbs/ac	> 90-150 lbs/ac	> 150 lbs/ac	1.0
Organic P Appl. Method	1	None Applied	Injected 3 - 6" below surface	Incorp. Immediately before planting	Incorporated > 3[6] mo. before planting	Surface Applied	8.0
P Fertilizer Appl. Method	1	None Applied	Placed w/ Planter Deeper than 2"	Incorp. Immediately before planting	Incorporated > 3[7] mo. before planting	Surface Applied	1.0
Edge of Field to Stream/lake[1]	1.5	V. Low > 1000 ft.	Low > 500 - 1000 ft.	Medium > 200 - 500 ft.	High 30-200 ft.	V. High < 30 ft.	0
Soil Erosion[2]	1.5	V. Low < 1 t/ac	Low 1 - 3 t/ac	Medium > 3 - 5 t/ac	High > 5-15 t/ac	V. High > 15 t/ac	1.5
Runoff Class[3]	1.5	Negligible & V. Low	Low	Medium	High	V. High	1.5
Irr. Erosion (see QS note)	1.5	Not[4] Irrigated	Tail water Recovery or[5]	QS > 10 for erosion resistant soils	QS > 10 for erodible soils	QS > 6 for very erodible soils	3.0
Grazing Management	0.5	Not Grazed	Only graze crop residue	Pasture < 30% Dry Matter as supp. feed	Pasture 30-80% Dry Matter as supp. feed	Pasture 80-100% D.M. as supp. feed	0
Vegetative Buffer	1.5	> 100 ft.	> 65 - 100 ft.	20 - 65 ft.	< 20 ft.	No Buffer	0

Enter Total P Index Points: e.g., 18

P Index Classification	Index Pts.	P Hazard Class	P Application Classification
	0 – 10	V. Low	N Based
	10 – 17	Low	N Based
	17 – 27	Med.	N Based
	27 – 37	High	P Based (1.5x crop removal)
	37 - 47	V. High	P Based (at crop removal)
	> 47	Excessive	No P application allowed

QS Note: Q = flow rate of water introduced into the furrow (in gpm). S = furrow slope (ft/100 ft, %). Q is multiplied by S: (e.g.: 5 gpm x 2% = 10).

(1) Proximity of Nearest Field Edge to Named Stream or Lake
(2) WEPS & RUSLE
(3) refer to Runoff Class Table (which is based on % field slope & soil permeability class (in/hr))
(4) or No Furrow Irrigation
(5) QS < 6 for Very erodible soils or QS < 10 for other soils
(6) or Surface Application < 3 Mo. before planting
(7) or Surface Applied < 3 months before planting

Phosphorus Index Rating (Reference: NRCS Agronomy Technical Note 57) rudy garcia 2008